

FACT SHEET

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FINANCIAL REQUIREMENTS FOR LIVESTOCK ENTERPRISES

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What does it take to make \$3,000 return to labor-management? What are the returns to land, labor and management? What resources are needed for full employment in a agricultural enterprise and what are the returns?

These are the types of questions farmers ask county agents and agricultural leaders.

Equipment, livestock units, land requirements, feed resources and similar items are the bundle of resources considered in developing income and expenses for an enterprise and the bases for borrowing finances.

As land, farm equipment, livestock and various input items increase in price, it becomes more important to estimate the resources needed for certain levels of return and full employment.

A level of \$3,000 return to labor-management was chosen as one of the common denominators and full employment for an operator in an enterprise as the other measuring factor to determine return and needed resources. Summaries of budgets are used to describe the expected returns for this particular presentation. Detail budgets are available if needed by the credit institution, county agent, or livestock operator. The detail budgets can be found in MP-380 revised and MP-931.

In analyzing budgets on egg production, broiler, swine, dairy and beef (cow-calf) production, the following is summarized. For resources with an expected return of \$3,000 to labor-management gross income varies from \$13,024 to \$32,648. Gross expenses vary from \$9,959 to \$29,572 annually.

For resources requiring full employment, the gross income varies from \$21,696 to \$54,212, and gross expenses vary from \$16,624 to \$40,014.

Return to labor-management and annual investment for the various enterprises follow:

Swine. With 20 brood sows and a \$4,885 average annual investment, there is a \$3,012 return to labor-management. Annual fixed expenses are \$933, and total operating expenses are \$9,079 divided by income flow periods.

With 72 brood sows and a \$21,450 average annual investment, there is a \$14,198 return to labor-management. Annual fixed expenses are \$4,031, and operating expenses are \$35,983 divided by income flow periods.

Poultry. With 5,000 hens for egg production, the return is \$3,076 for labor-management and an \$18,160 average annual investment. Annual fixed expenses are \$2,084, and operating expenses are \$27,488 divided by income flow periods.

With 45,000 head broiler capacity and a \$21,050 average annual investment, there is a \$3,103 return to labor-management. Annual fixed expenses are \$5,934, and operating expenses are \$4,023 divided by income flow periods.

With 75,000 head broiler capacity and a \$34,950 average annual investment, the return to labor-management is \$5,072 for full employment. Annual fixed expenses amount to \$9,866, and operating capital amounts to \$6,750, divided by income flow periods. Broilers are produced on a contract basis. This is why operating expenses are less for the operator although the contractor would have operating expenses such as feed costs or medication.

Dairy. With 36 cows (10,000 pounds per cow) and a \$47,783 average annual investment, the return to labor-management is \$3,022. With 36 cows and 10,000 pounds production, the annual fixed ex-

penses are \$5,228, and the operating expenses amount to \$12,990 divided by income flow periods.

At 12,000 pounds per cow, the return to labor-management is \$5,375. The annual fixed expenses are \$5,814 and the operating expenses are \$14,011 divided by income flow periods.

With 60 cows, the average annual investment is \$69,068. At the 10,000 pounds production level per cow, the labor-management return is \$6,790. The annual fixed expenses are \$7,662, and the operating expenses are \$19,948 divided by income flow periods.

With 12,000 pounds production per cow, the return to labor-management is \$11,659. The annual fixed expenses are \$7,859, and the operating expenses are \$22,482 divided by income flow periods. **Beef (cow-calf).** With 200 mother cows, 1,666 hours labor are required and a \$111,725 average annual investment. The return to labor-management is \$3,125, and the return to land, labor and management is \$6,425. The annual fixed expenses are \$9,721, and the operating expenses are \$11,834 divided by income flow periods.

With 300 mother cows, 2,500 hours labor are required and a \$164,250 average annual investment.

The return to labor-management is \$5,703, and the return to land, labor and management is \$10,103. The annual fixed expenses are \$14,462, and the annual operating expenses are \$15,985 divided by income flow periods. (This may be improved by including a stocker calf or conditioning program—or by a pasture-forage fertilization program.)

The above investments, returns, estimated fixed expenses and operating expenses indicate the importance of planned financial management between the agricultural financial institution and the operator. Planned management may give higher returns than has previously been experienced.

Land prices used in these analyses are based on new land studies as released in B-1063, "Trends in the Texas Farm and Ranch Land Market," and expected increases based on the new trends in consultation with A. B. Wooten, professor, Department of Agricultural Economics and Sociology, Texas A&M University.

This total analysis is presented as a guide. Estimates for a particular individual operation will vary with resources available, location, price and other factors.

TABLE 1. INVESTMENT REQUIREMENTS FOR AN APPROXIMATE \$3,000 LABOR-MANAGEMENT RETURN

| Enterprise | Price | No. of Units | Hr. of Labor | Av. Annual Investment | Return to Labor-Mgmt. | Return to Land, Labor & Mgmt. ³ | Fixed and Operating Capital Requirement |
|----------------------|--|--|--------------|-----------------------|-----------------------|--|---|
| Egg production | 36 1/2¢ per doz. | 5,000 Hens | 2,500 | \$ 18,160 | \$3,076 | \$3,118 | \$ 2,084 F \$27,488 O ⁴ |
| ¹ Broiler | \$1.90/cwt. Contract to producer for producing | 45,000 capacity 97 % liveability X 4 1/2 batches = 196,425 birds sold annually | 1,440 | \$ 21,050 | \$3,103 | \$3,160 | \$ 5,934 F \$ 4,023 O ⁴ |
| ² Swine | \$18.50/cwt. (220 lb. Hogs market) | 20 sows 320 hogs marketed | 640 | \$ 4,885 | \$3,012 | \$3,122 | \$ 933 F \$ 9,079 O ⁴ |
| Dairy | Milk \$5.50/cwt. | 36 cows at 10,000 lb. per cow | 3,600 | \$ 47,783 | \$3,022 | \$4,030 | \$ 5,228 F \$12,990 O ⁴ |
| Dairy | Milk \$5.50/cwt. | 36 cows 12,000 lb. | 3,600 | \$ 47,783 | \$5,375 | \$6,383 | \$ 5,814 F \$14,011 O ⁴ |
| Beef Cow-Calf | \$24.00/cwt. | 200 mother cows 92 % calf, 10 % replacement 500 lb. calves | 1,666 | \$111,725 | \$3,125 | \$6,425 | \$ 9,741 F \$11,834 O ⁴ |

¹(Based on mimeographed release of James T. Long, Extension area farm management specialist)

²(Based on mimeographed release of James S. Denton, Extension area farm management specialist & Tom E. Prater, with provisions for higher feed conversion, heavier marketed hogs, and increased number of animals marketed, in consultation with T. D. Tanksley, Jr., animal husbandman)

³If land is owned, the opportunity cost charge returns to owner as an investment return.

⁴Because of the nature of cash income flow from sales, this operating expense capital requirement likely will be divided by income flow periods.

TABLE 2. INVESTMENT REQUIREMENTS AND RETURN FOR FULL EMPLOYMENT GUIDE SUMMARY—LIVESTOCK

| Enterprise | Price | No. of Units | Hr. of Labor | Av. Annual Investment | Return To Labor-Management | Return To Land, Labor and Management | Fixed and Operating Capital Requirement |
|--|--|--|--|-----------------------|----------------------------|--------------------------------------|---|
| Egg production | 36 1/2¢ per doz. | 5,000 hens | 2,500 | \$ 18,160 | \$ 3,076 | \$ 3,118 | \$ 2,084 F \$27,488 O ¹ |
| Broiler | \$1.90/cwt. Contract to producer for producing | 75,000 capacity X 97% livability X 4 1/2 batches = 326,250 birds sold annually | 2,400 (note: 20 hr. required 1st 5 days. This means houses must be staggered or some help hired) | \$ 34,950 | \$ 5,072 | \$ 5,156 | \$ 9,866 F \$ 6,750 O ¹ |
| (Producer furnishes labor, buildings, and equipment. Contractor furnished birds, feed, and other items used in raising.) | | | | | | | |
| Swine | \$18.50/cwt. | 72 sows, 1,332 hogs marketed | 2,664 | \$ 21,450 | \$14,198 | \$14,363 | \$ 4,031 F \$35,983 O ¹ |
| Dairy | Milk \$5.50/cwt. | 60 cows at 10,000 pounds | 4,020* | \$ 69,068 | \$ 6,790 | \$ 8,189 | \$ 7,662 F \$19,948 |
| Dairy | Milk \$5.50/cwt. | 60 cows at 12,000 pounds | 4,020* | \$ 69,068 | \$11,659 | \$13,058 | \$ 7,859 F \$22,482 O ¹ |
| Beef cow-calf | \$24.00/cwt. | 300 mother cows at 92% calf crop 10% replacement; 500 lb. calves | 2,500 (If calves are 30¢/cwt., the return to labor-management is \$13,383) | \$164,250 | \$ 5,703 | \$10,103 | \$14,462 F \$15,985 O ¹ |

*1,400 hr. extra family or hired labor

¹Because of the nature of cash income flow from sales this operating expense capital requirement likely will be divided by income flow periods.

